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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/744,395	04/11/2001	Toshiyuki Kori	43890-477	5717

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MCDERMOTT WILL & EMERY LLP
600 13TH STREET, N.W.
WASHINGTON, DC 20005-3096

EXAMINER

BOCCIO, VINCENT F

ART UNIT PAPER NUMBER

2616

DATE MAILED: 01/11/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/744,395

Applicant(s)

KORI ET AL.

Examiner

Vincent F. Boccio

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on Election on 11/2/05.
2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
4a) Of the above claim(s) 3 and 13-16 is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1,2 and 4-12 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 5/30/01, 5/24/01, 10/24/01
4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____

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DETAILED ACTION

The Group and/or Art Unit location of your application in the PTO has changed. To aid in correlating any papers for this application, all further correspondence regarding this application should be directed to Group Art Unit 2616.

Election/Restrictions

1. Claims 2, 13-16 are withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected species, there being no allowable generic or linking claim. Election was made **without** traverse in the reply filed on 11/2/05.

Elected claims 1-2, 4-12.

Claim Objections

2. Claim 1 is objected to because of the following informalities:

{A} Claim 1, lines 7-8, "the image outputting device side", has no antecedent basis, the examiner suggests removing, "the".

Furthermore, the limitation is interpreted as a display device, being an image outputting device to render images thereto.

{B} Claim 1, lines 9-10, which recites, "the image outputting device", in line 2, recites, "image outputting devices", therefore, there is deemed no clear antecedent basis, the examiner suggests, "transmitted from one of the image outputting devices", or from one of the cameras devices to an output or a display.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the

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effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1, 7 are rejected under 35 U.S.C. 102(e) as being anticipated by Katta et al. (US 2004/0085447 A1).

Regarding claim 1 Katta et al. discloses and meets the limitations associated with

- an image switching device for switching a plurality of image outputting devices connected through a digital interface (Fig. 1, "8") and delivering the image signals

comprising:

- image switching control means for sending image switching control data (page 7, [0077], switching, data rate, switching composite image display types/layouts, "touch signal again and thereby sends the switching signal for switching the composite image", "image quality control signal", switches quality, etc.....);
- for selecting and controlling a desired device out or output (page 13, [0131], Fig. 20, "110 may cut out the image in the position according to the layout information from one image and transmit only the cut out image toward the transmission line 115");
- of the plurality of image devices (Fig. 20, "111-1, 2, 3", page 7, [0077], "image quality control signal ... camera nodes coding ... 6 Mbps ... camera node ... 14 Mbps ... other nodes ... 4 Mbps"),
- to the image outputting device side (see camera image display or an output, Fig. 3, "13", Fig. 4, 20, "113", Fig. 25 a-d, Fig. 26, etc.....),
- the image switching control data image selecting means for selecting and receiving the image signal transmitted from at least one of the image

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outputting device according to the image switching control data (page 7, "switching signal for switching" Fig. 25 a-d, etc.....; and

- synchronous signal transmitting mean (Fig. 27, "1513 & 1518) for transmitting a synchronous timing signal for synchronizing the image outputting devices.

Regarding claim 7, wherein the switcher control data of image outputting devices contains transmission channels and transmission command (Fig. 13, layout information from 114 to 115 to 110-1, 101) to specified image outputs (Fig. 20, [0131], "apparatus 110 may cut out the image in .. accord.. to the layout ... transmit only the cut out toward line 115", also [0140], [0129], channels and transfer of synchronization data).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(f) or (g) prior art under 35 U.S.C. 103(a).

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4. Claims 2, 4, 5/2, 5/4, 6, 8/2, 8/4, 9/2, 9/4, 10-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Katta et al. (US 2004/0085447 A1).

Regarding claims 2, 4, Katta discloses and meets the limitations of, wherein the interface or bus conforms to IEEE1394, page 13, [0129] and further the synchronizing timing but, only provides some detail such as cycle time 125, period of 96 bytes or more is set, number of channels and implements the transmission line 115, Fig. 13,

and therefore, fails to particularly disclose wherein the image and synchronizing signals are transmitted in the isochronous mode, as claimed in claims 2 & 4,

wherein claims 4, 5/2, 5/4 further recites wherein the image switching control is transmitted to the synchronous signal transmitting means (met by Fig. 27, 1510 & 1515 both elements read on transmitting frame synchronization signals, associated with the image details of Fig. 13), but, fails to disclose that the control is transmitted in the asynchronously mode,

wherein claim 5 further recites to transmit on either a isochronous or asynchronous modes, used to send image and synchronization signals,

claim 6, control data in asynchronous mode.

The examiner takes official notice that it is well known and implied in the art, that when utilizing a 1394 interface and sending video or images, are known to be send isochronously and further control data, is suggested to be sent asynchronously, wherein isochronous modes are known to be real time and are utilize to send data that is required/desired to be transmitted in real time or are time dependent data, wherein control data is not deemed as time critical, therefore, asynchronous mode, as is well known in the art.

Therefore, it would have been obvious to one skilled in the art at the time of the invention to send in a isochronous transmission mode, to transmit from the image capturing means and associated synchronization signals in that mode, based on the signals are time critical and to send all control asynchronously, not being critically as time dependent as the

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image or video and associated synchronization signals, as is well known to those skilled in the art.

It is further obvious based on above, to either transmit by asynchronous or isochronous modes for, image and synchronization signals, suggested to be isochronous in the art, as recited in claim 5.

Claims 8/2, 8/4 has been analyzed and discussed with respect to the claims above, wherein as applied the prior art meets the limitation of wherein the synchronization timing signal is transmitted to all image outputs (Fig. 27), further a channel based on IEEE 1394 would have to be set, to transfer the synchronization signal to the all image outputs, therefore, deemed met or obvious as applied in view of Katta etc....

Regarding claim 9, Katta provides for synchronizing timing signals being transmitted in a specific channel to plural image outputs (Fig. 27).

Claims 10 is analyzed and discussed with respect to the claims above, wherein since established to be obvious, that control to be sent asynchronously and image and sync., since have required arrival times (isochronously), would be sent in different channels, being asynchronous and isochronous channels types or modes, in accord to IEEE 1394, deemed met if not obvious in view of IEEE 1394.

Regarding claims 11-12, the combination as applied provides for wherein the bus has a total bandwidth of 30 Mbps, wherein rates such as, 14, 6 & 4 Mbps signals can be generated, one at 14 the others at 4 Mbps, but, fails to disclose using one or the same channel to transmit more than one of the signals from the image outputting device, claim 11.

Katta provides for selection a channel for an output device at setting the rate/bandwidth to either 14, 6, or 4 Mbps for that channel and selecting at least another channel for another output device (page 7, etc.....),

but, fails to disclose using one channel for other image outputting devices, interpreted as at least two devices using one channel and further fails to provide for setting the number of transmission frames of the specified image outputting device is a specified value and wherein the number of transmission frames of the remainder is zero.

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The examiner takes official notice that setting the frame size or number of transmission frames from a source is well known, providing multiplexing of more than one source, such as time division multiplexing of also well known, further controlling to not provides frames or to selectively provide or to provide zero is also deemed known in the art.

Therefore, it would have been obvious to one skilled in the art at the time of the invention to modify Katta by incorporating multiplexing means to merge more than one image stream to send on a single channel, as is an obvious well known technique in the art, thereby more than one stream can be send on one channel, rather the requires all separate channels, being an obvious design choice to utilize multiplexing or streams, in this case two 4 Mbps stream is deemed obvious to multiplex to generate a 8 Mbps stream.

It is further deemed obvious to further modify Katta to control the number of frames generated from one or more of the sources, frames per/second, rates, controlled based on importance of the stream generated, as is obvious to those skilled in the art.

It is further obvious to modify Katta by providing selection of sources, to not rendering images from one or more sources, as desired, as is further obvious to those skilled in the art in surveillance, thereby to selecting provide source images, as desired.

Contact Fax Information


Any response to this action should be faxed to:

(571) 273-8300, for communication as intended for entry,
this Central Fax Number as of 7/15/05

Contact Information

Any inquiry concerning this communication or earlier communications should be directed to the examiner of record, Monday-Tuesday & Thursday-Friday, 8:00 AM to 5:00 PM Vincent F. Boccio (571) 272-7373.

Primary Examiner, Boccio, Vincent
1/6/06


VINCENT BOCCIO
PRIMARY EXAMINER